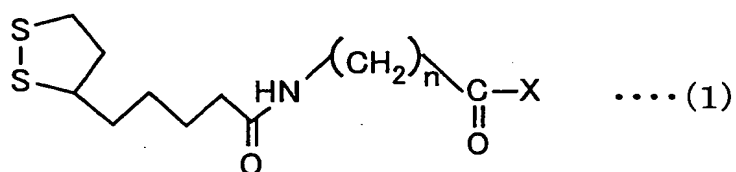


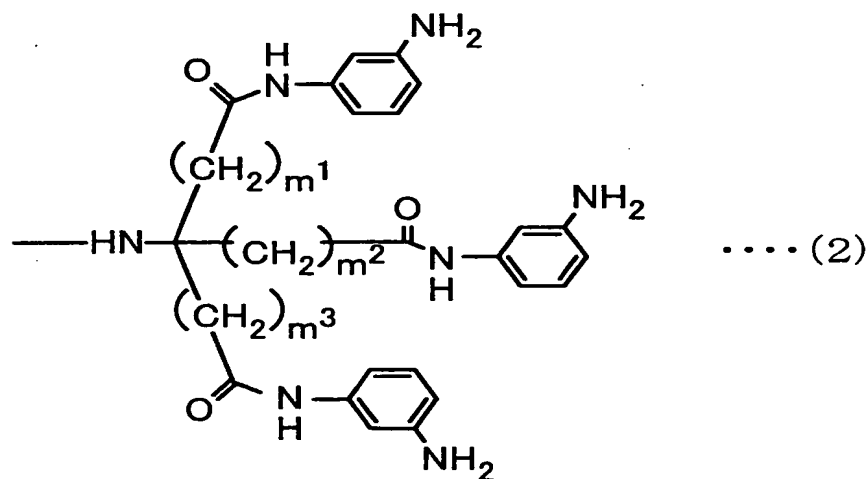
CLAIMS:

1. (Amended) A linker compound of
a structure represented by following general formula (1),
where n is an integer of 1 to 6, and

X has a structure serving as a multi-branched structure moiety including three or four hydrocarbon derivative chains, wherein the hydrocarbon derivative chains each include an aromatic amino group at an end thereof, and a carbon-nitrogen bond and an amide bond in a backbone thereof.



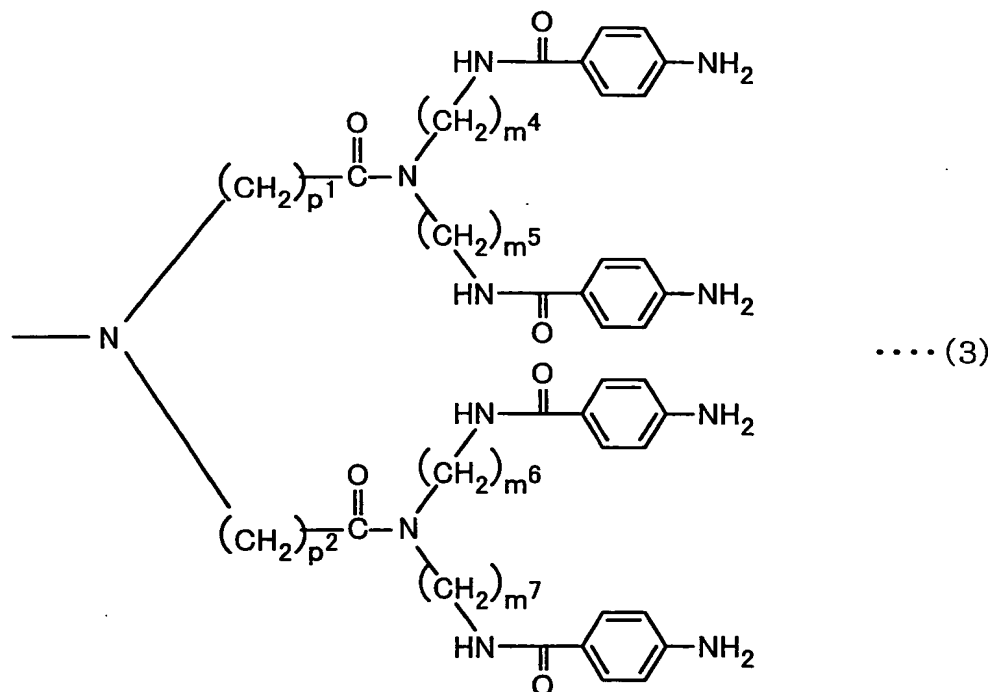
2. The linker compound according to Claim 1, wherein said X has a structure represented by the following formula (2), wherein m^1 , m^2 , and m^3 are independently an integer of 1 to 6.



3. The linker compound according to Claim 2, wherein m^1 , m^2 , and m^3 are all 2 in said general formula (2).

4. The linker compound according to Claim 1, comprising

a structure represented by following formula (3), where m^4 , m^5 , m^6 , m^7 , p^1 , and p^2 are independently an integer of 1 to 6.



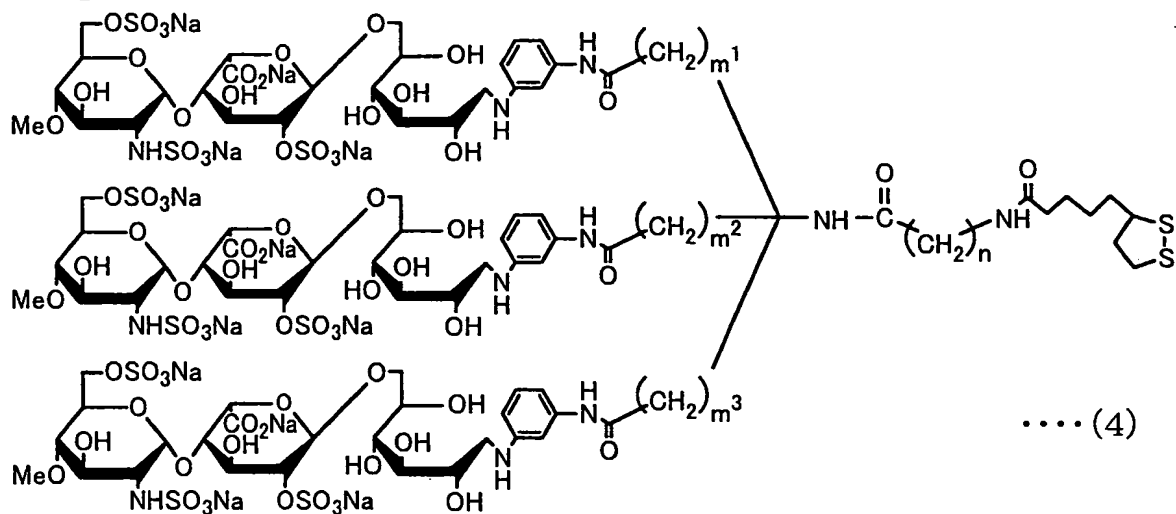
5. The linker compound according to Claim 2, wherein m^4 , m^5 , m^6 , and m^7 are all 2 and p^1 and p^2 are both 1 in the general formula (3)

6. A ligand which comprises the aromatic amino group of the linker compound according to any one of Claims 1 to 5, and a sugar molecule introduced into the aromatic amino group.

7. The ligand according to Claim 6, wherein the sugar molecule is at least one kind of sugar selected from the group consisting of a monosaccharide, an oligosaccharide, and a polysaccharide.

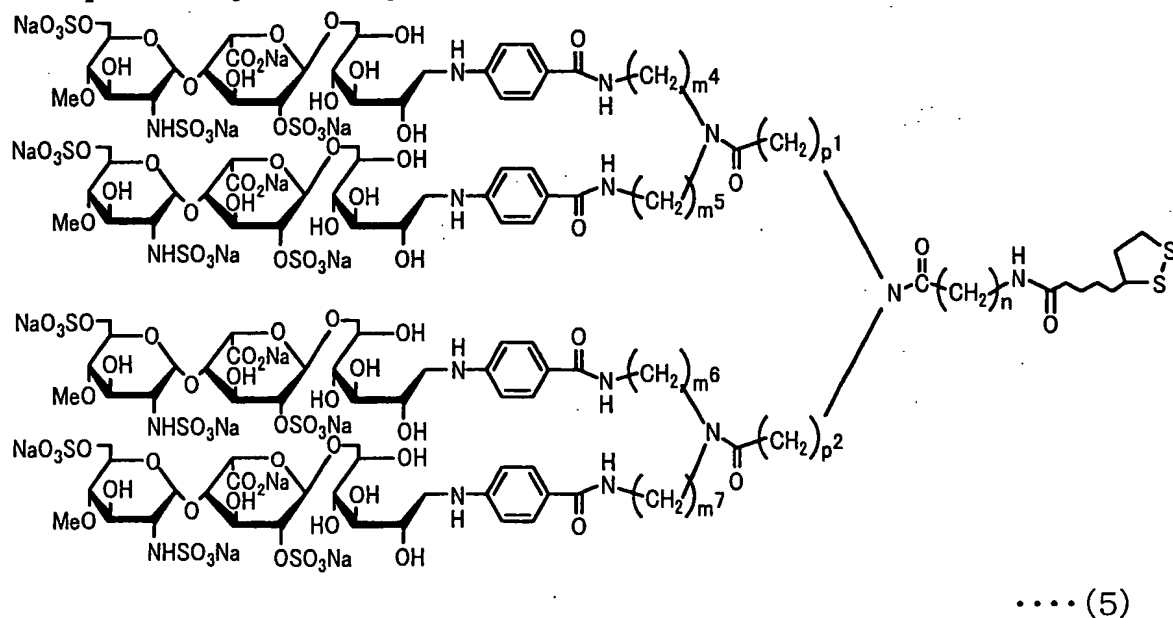
8. A ligand of a structure represented by following general formula (4), wherein m^1 , m^2 , m^3 , and n are independently an

integer of 1 to 6.



9. The ligand according to Claim 8, wherein m^1 , m^2 , and m^3 are all 2 and n is 1 in the general formula (4).

10. A ligand comprising a structure represented by following formula (5), wherein m^4 , m^5 , m^6 , m^7 , n , p^1 , and p^2 are independently an integer of 1 to 6.



11. The ligand according to Claim 10, wherein m^4 , m^5 , m^6 ,

and m^7 are all 2, and n is 1, and p^1 and p^2 are both 1 in the general formula (5).

12. A producing method of a linker compound, comprising the steps of:

carrying out a condensation reaction between thioctic acid and an amine compound including three or four branched chains each having an aromatic amino group end protected by a protecting group; and

deprotecting the protecting group at the aromatic amino group end.

13. A producing method of a ligand, comprising the step of carrying out a reductive amination reaction using the linker compound according to any one of Claims 1 to 5, and a sugar molecule.

14. A sugar molecule introducing method for arranging a sugar molecule on a surface of a supporter,

said method comprising the step of causing a solution containing the ligand of any one of Claims 6 to 11 to come into contact with a supporter whose surface has a metal.

15. A ligand carrier which comprises the ligand of any one of Claims 6 to 11 immobilized on a supporter whose surface has a metal.

16. The ligand carrier according to Claim 15 used as a sensor chip for a surface plasmon resonance measurement.

17. The ligand carrier according to Claim 15 used as a column for affinity chromatography.